

[54] **ALARM TIMEPIECE**

[75] Inventor: **Kazuo Tanaka**, Tokyo, Japan

[73] Assignee: **Citizen Watch Company Limited**,
Tokyo, Japan

[22] Filed: **July 14, 1972**

[21] Appl. No.: **271,727**

[30] **Foreign Application Priority Data**

July 15, 1971 Japan..... 46/52716

[52] U.S. Cl..... 58/16.5, 58/19, 58/38

[51] Int. Cl. G04c 21/16, G04b 23/06

[58] Field of Search..... 58/16.5, 19, 38,
58/57.5

[56] **References Cited**

UNITED STATES PATENTS

| | | | |
|-----------|--------|------------------|---------|
| 3,233,401 | 2/1966 | Hoffman et al. | 58/19 R |
| 1,019,193 | 3/1912 | Schneider et al. | 58/19 R |
| 2,786,524 | 3/1957 | Schwab | 58/16.5 |

Primary Examiner—George H. Miller, Jr.

Attorney—Holman et al.

[57]

ABSTRACT

An alarm mechanism having an improved presetting device for use in a small timepiece, especially an alarm watch. A multi-point presetter is provided comprising a unique memory device comprising in turn a stationary preset ring having a number of substantially inwardly extending elongated resilient spring contact arms, on the one hand, and an alarm switch disc which is arranged to rotate in unison with the hour hand of the watch movement, on the other. When a manipulating crown or knob is turned so as to bring the alarm switch disc to a certain predetermined position corresponding to a first alarm time point, and it is pulled in. Then, a corresponding one of the spring contact arm is forcibly transferred from below to the top of the disc, so as to occupy a preset memory position. Second and further presetting operations can be performed in the similar way as above. When the hour hand arrives at the earlier preset position, a conductive layer or member provided on the disc is brought into electrical connection with the preset one of the contact arms, so as to energize an electrical alarming buzzer.

11 Claims, 10 Drawing Figures

